6 MUSIC INFORMATION SERVICE SERVER

4 PORTAL SERVER

5 CONTENT SERVER

1 CONTENT DISTRIBUTION SYSTEM

3

2A CLIENT TERMINAL

2B

2C

FIG. 1

AR1

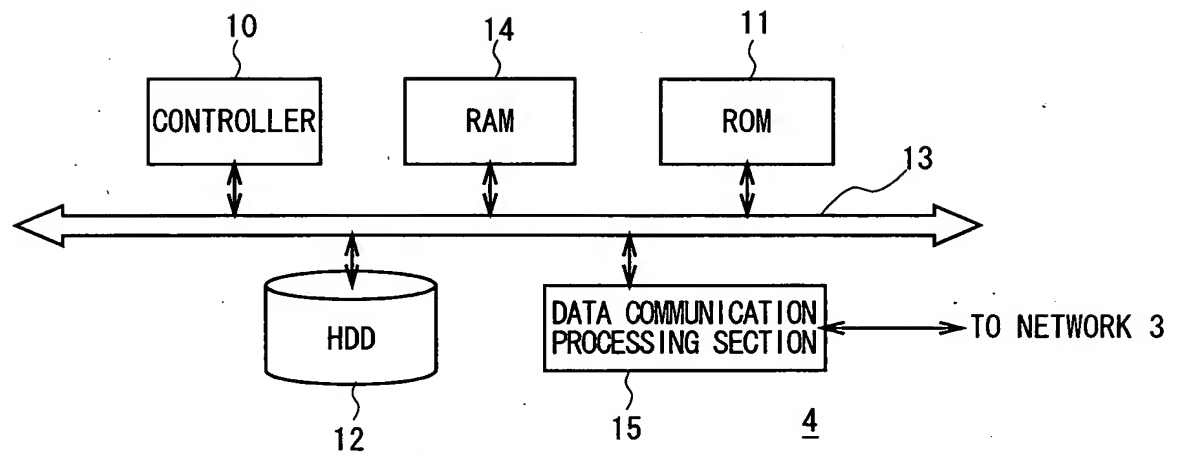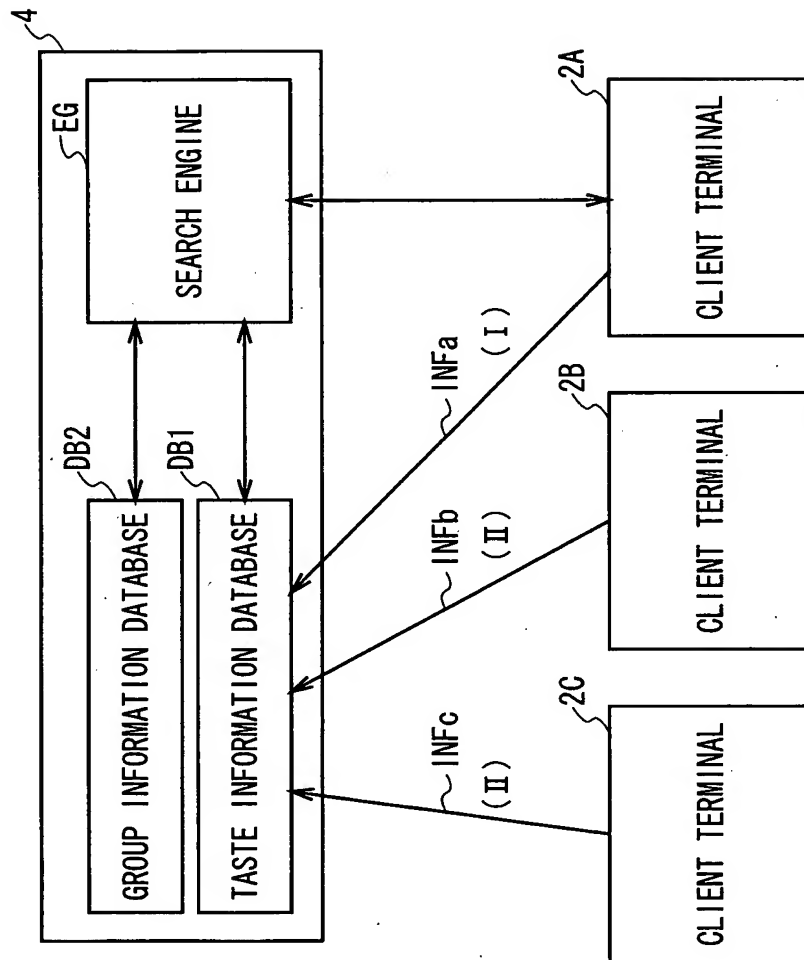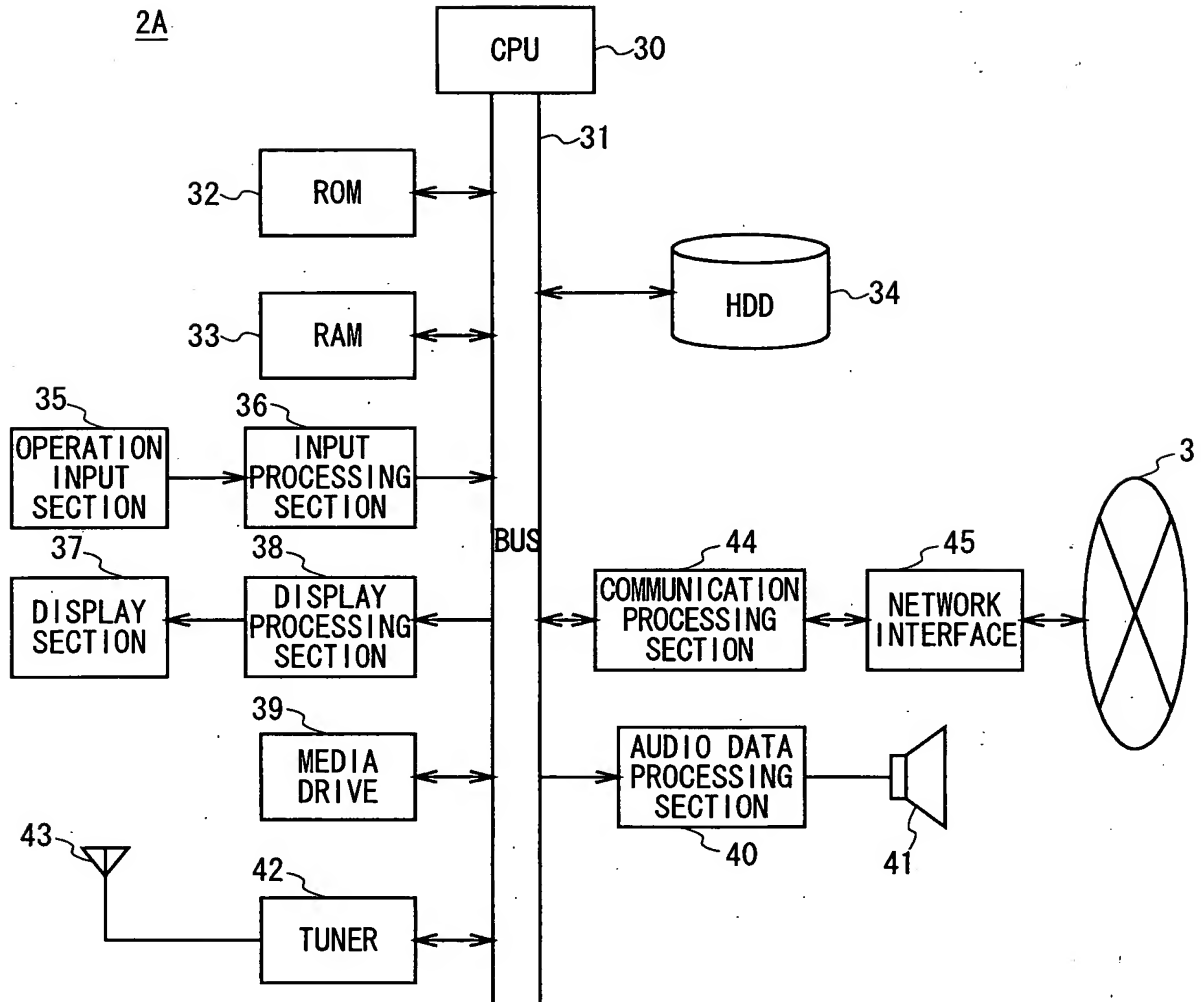| FAVORITES |
|---|
| "ABOUT NURSERY RHYMES" |
| "SECRET OF RED DRAGONFLY" |
| "INVITATION TO HOMETOWN SONGS" |
| "ASSOCIATION OF NURSERY RHYMES OF TSUGARU" |
| "GRANDFATHER'S CLOCK" |
| |
| |
| |

FIG. 2

FIG. 3

FIG. 4

2A

CPU ~30

~31

32~ ROM

HDD ~34

33~ RAM

35~ OPERATION INPUT SECTION

36~ INPUT PROCESSING SECTION

BUS

37~ DISPLAY SECTION

38~ DISPLAY PROCESSING SECTION

44~ COMMUNICATION PROCESSING SECTION

45~ NETWORK INTERFACE

3

39~ MEDIA DRIVE

AUDIO DATA PROCESSING SECTION

~40

41

43~

42~ TUNER

FIG. 5

FIG. 6

FIG.7

FIG. 8

PORTAL SERVER — 4

SP2 — REGISTER TASTE INFORMATION IN TASTE INFORMATION DATABASE

SP4 — SEARCH FOR TASTE INFORMATION

SP5 — SEARCH FOR GROUP NAME INFORMATION

SP6 — TRANSMIT GROUP NAME INFORMATION

CLIENT TERMINAL — 2A

SP1 — TRANSMIT TASTE INFORMATION

SP3 — TRANSMIT URL AS SEARCH KEY INFORMATION

SP7 — DISPLAY GROUP NAME INFORMATION
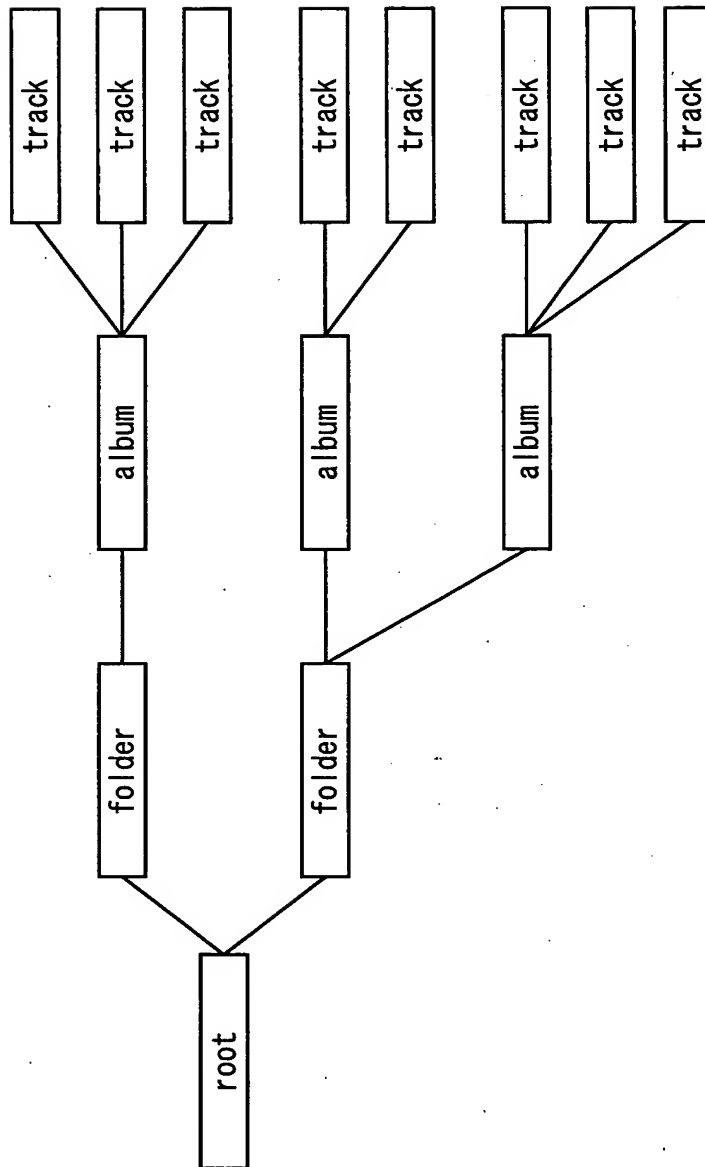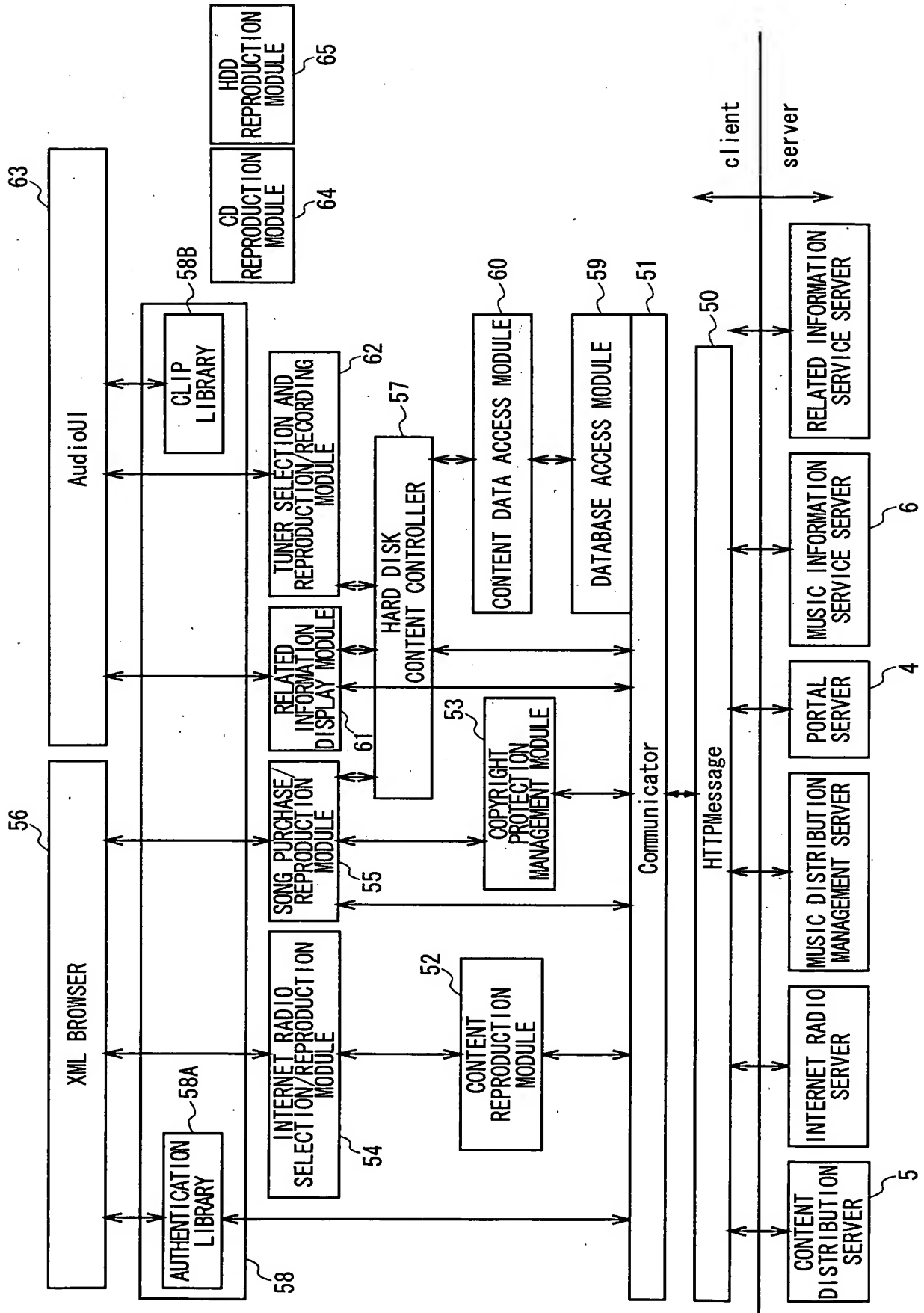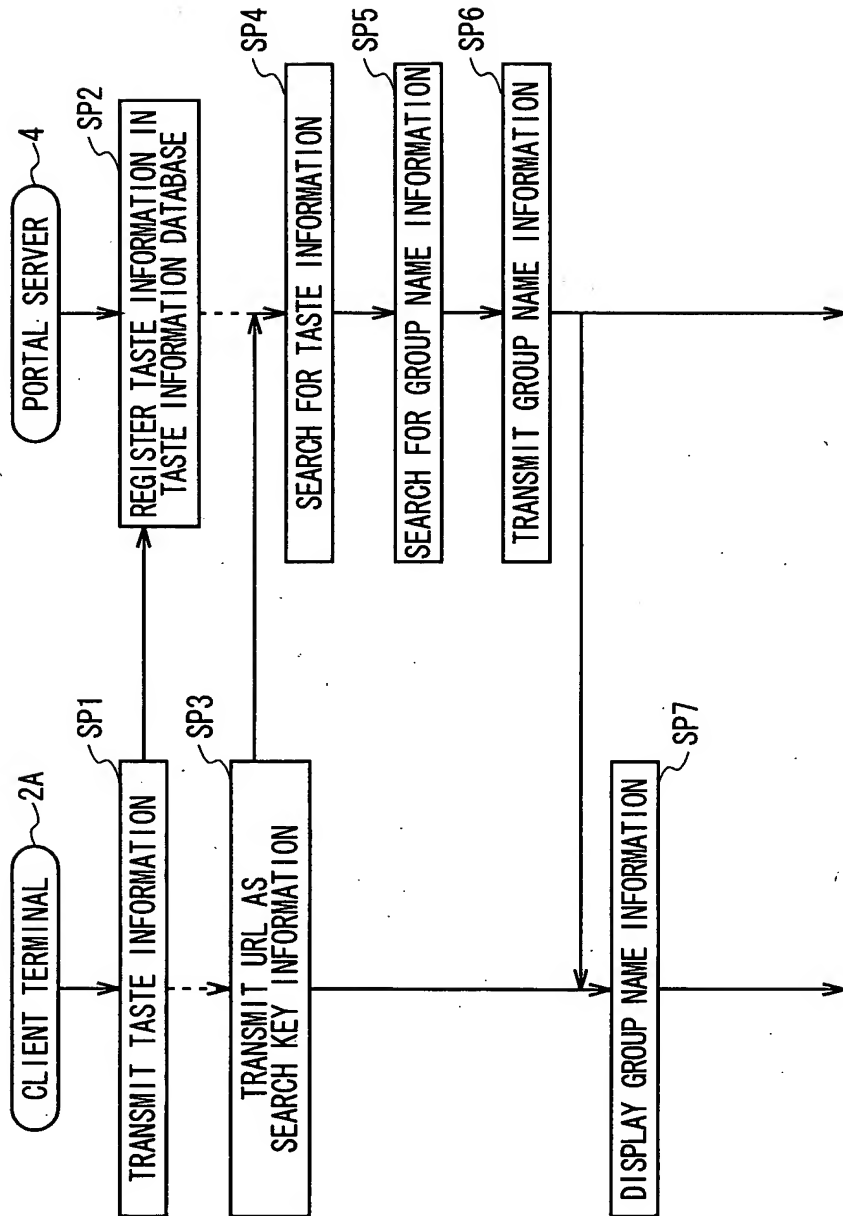
GROUP NUMBER:1

AR1

FAVORITES

¥" JAPANESE NURSERY RHYMES GROUP"

"ABOUT NURSERY RHYMES"

"SECRET OF RED DRAGONFLY"

"INVITATION TO HOMETOWN SONGS"

"ASSOCIATION OF NURSERY RHYMES OF TSUGARU"

"GRANDFATHER'S CLOCK"

FIG. 9

GROUP NUMBER:1

AR1

FAVORITES	¥" JAPANESE NURSERY RHYMES GROUP" (www.xxx.ne.jp/ccc.htm)
"ABOUT NURSERY RHYMES"	→ UserC (userc@xxx.ne.jp)
"SECRET OF RED DRAGONFLY"	→ hanako (hanako@xxx.ne.jp)
"INVITATION TO HOMETOWN SONGS"	→ taro (taro@xxx.ne.jp)
"ASSOCIATION OF NURSERY RHYMES OF TSUGARU"	→ matsu (matsu@xxx.ne.jp)
"GRANDFATHER'S CLOCK"	· · ·

FIG. 10

PORTAL SERVER 4

CLIENT TERMINAL 2A

SP1 TRANSMIT PREFERENCE INFORMATION

SP2 REGISTER PREFERENCE INFORMATION IN PREFERENCE INFORMATION DATABASE

SP10 TRANSMIT PREFERENCE INFORMATION AS SEARCH KEY INFORMATION

SP11 SEARCH FOR PREFERENCE INFORMATION

SP12 SEARCH FOR GROUP NAME INFORMATION

SP13 TRANSMIT GROUP NAME INFORMATION

SP14 DISPLAY GROUP NAME INFORMATION

FIG. 11

CLIENT TERMINAL — 2A

PORTAL SERVER — 4

SP1 — TRANSMIT PREFERENCE INFORMATION

SP2 — REGISTER PREFERENCE INFORMATION IN PREFERENCE INFORMATION DATABASE

SP3 — TRANSMIT URL AS SEARCH KEY INFORMATION

SP20 — SEARCH FOR PREFERENCE INFORMATION

SP21 — SEARCH FOR GROUP NAME INFORMATION

SP22 — ASSOCIATE PREFERENCE INFORMATION WITH GROUP NAME INFORMATION AND TRANSMIT THEM

SP23 — CALCULATE NUMBER OF URLS

SP24 — DISPLAY PREFERENCE INFORMATION NAME AND GROUP NAME INFORMATION ASSOCIATED WITH EACH OTHER

FIG. 12

NUMBER OF HITS:4

AR1

FAVORITES	
"ABOUT NURSERY RHYMES"	¥"PREFERENCE INFORMATION OF USER C"(NUMBER OF THE SAME URLS:5) - "JAPANESE NURSERY RHYMES GROUP"
"SECRET OF RED DRAGONFLY"	¥"PREFERENCE INFORMATION OF hanako"(NUMBER OF THE SAME URLS:3) - "NURSERY RHYMES OF THE WORLD GROUP"
"INVITATION TO HOMETOWN SONGS"	¥"PREFERENCE INFORMATION OF taro"(NUMBER OF THE SAME URLS:1) - "JAPANESE POPS GROUP"
"ASSOCIATION OF NURSERY RHYMES OF TSUGARU"	¥"PREFERENCE INFORMATION OF matsu"(NUMBER OF THE SAME URLS:1) - "JAPANESE FOLKSONGS GROUP"
"GRANDFATHER'S CLOCK"	

FIG. 13

FAVORITES	NUMBER OF HITS:4
"ABOUT NURSERY RHYMES"	¥"PREFERENCE INFORMATION OF USER C"(NUMBER OF THE SAME URLS:5)
"SECRET OF RED DRAGONFLY"	- "JAPANESE NURSERY RHYMES GROUP"
"INVITATION TO HOMETOWN SONGS"	┌ INVITATION TO HOMETOWN SONGS
"ASSOCIATION OF NURSERY RHYMES OF TSUGARU"	├ ACORN SONG
"GRANDFATHER'S CLOCK"	├ ABOUT NURSERY RHYMES
	├ SECRET OF RED DRAGONFLY
	├ GRANDFATHER'S CLOCK
	├ ASSOCIATION OF NURSERY RHYMES OF TSUGARU
	└ BUBBLE SONG
	¥"PREFERENCE INFORMATION OF hanako"(NUMBER OF THE SAME URLS:3)
	- "NURSERY RHYMES OF THE WORLD GROUP"
	¥"PREFERENCE INFORMATION OF taro"(NUMBER OF THE SAME URLS:1)
	- "JAPANESE POPS GROUP"
	¥"PREFERENCE INFORMATION OF matsu"(NUMBER OF THE SAME URLS:1)
	- "JAPANESE FOLKSONGS GROUP"

AR1

FIG. 14

AR1 →	NUMBER OF HITS:4

FAVORITES	¥"PREFERENCE INFORMATION OF USER C"(NUMBER OF THE SAME URLS:5)
	  - "JAPANESE NURSERY RHYMES GROUP"
	
	  INVITATION TO HOMETOWN SONGS
	  ACORN SONG
	  ABOUT NURSERY RHYMES
	  SECRET OF RED DRAGONFLY
	  GRANDFATHER'S CLOCK
	  ASSOCIATION OF NURSERY RHYMES OF TSUGARU
	  BUBBLE SONG

"ABOUT NURSERY RHYMES"	
"SECRET OF RED DRAGONFLY"	
"INVITATION TO HOMETOWN SONGS"	
"ASSOCIATION OF NURSERY RHYMES OF TSUGARU"	¥"PREFERENCE INFORMATION OF hanako"(NUMBER OF THE SAME URLS:3) - "NURSERY RHYMES OF THE WORLD GROUP"
"GRANDFATHER'S CLOCK"	¥"PREFERENCE INFORMATION OF taro"(NUMBER OF THE SAME URLS:1) - "JAPANESE POPS GROUP"
"ACORN SONG"	¥"PREFERENCE INFORMATION OF matsu"(NUMBER OF THE SAME URLS:1) - "JAPANESE FOLKSONGS GROUP"
ADD AND DISPLAY	

FIG. 15

PORTAL SERVER 4

SP2 REGISTER PREFERENCE INFORMATION IN PREFERENCE-INFORMATION DATABASE

SP30 SEARCH FOR PREFERENCE INFORMATION

SP31 SEARCH FOR GROUP NAME INFORMATION

SP32 ASSOCIATE PREFERENCE INFORMATION WITH GROUP NAME INFORMATION AND TRANSMIT THEM

CLIENT TERMINAL 2A

SP1 TRANSMIT PREFERENCE INFORMATION

SP10 TRANSMIT PREFERENCE INFORMATION AS SEARCH KEY INFORMATION

SP33 DISPLAY PREFERENCE INFORMATION NAME AND GROUP NAME INFORMATION ASSOCIATED WITH EACH OTHER

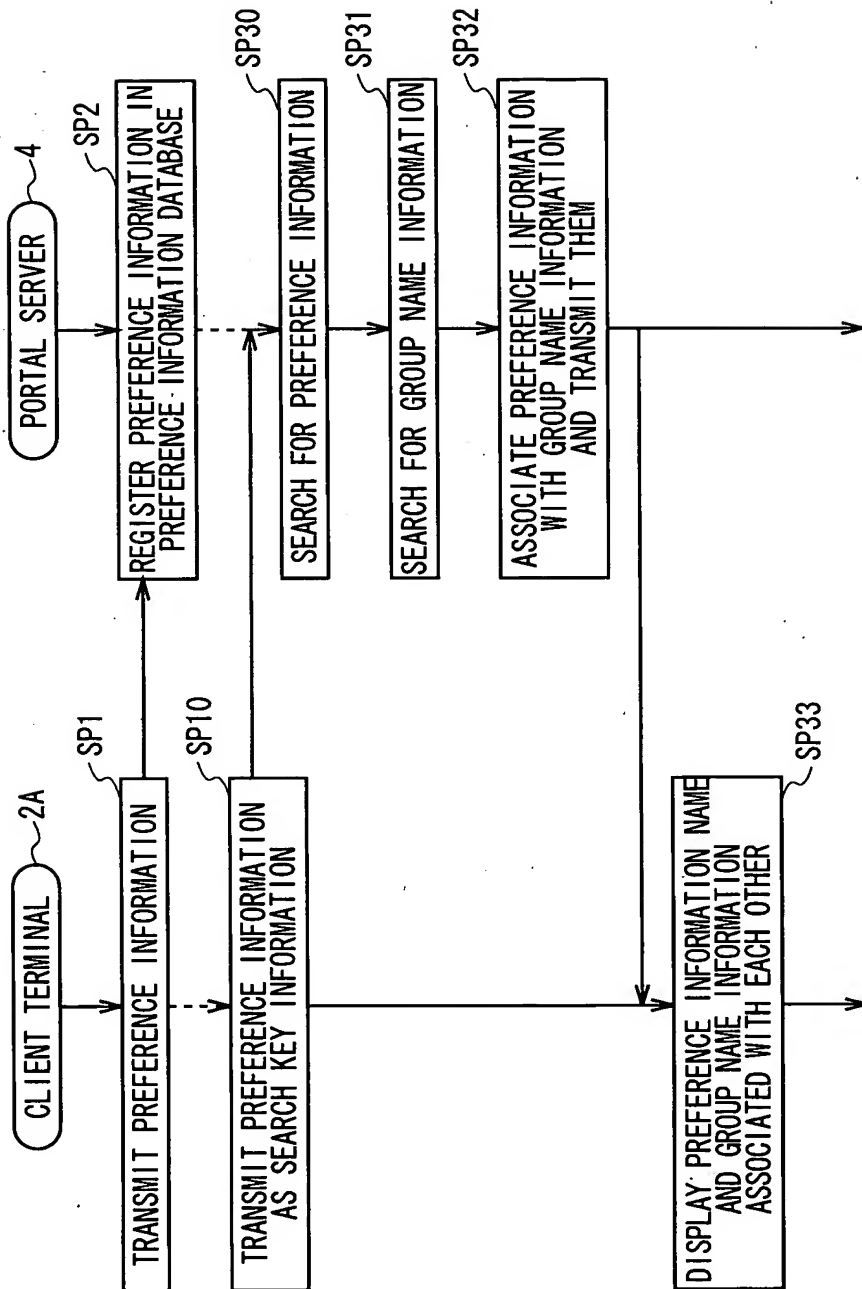FIG. 16

16/18

NUMBER OF HITS:2

AR1

FAVORITES	¥"PREFERENCE INFORMATION OF USER C" – "JAPANESE NURSERY RHYMES GROUP" ¥"PREFERENCE INFORMATION OF kato" – "JAPANESE NURSERY RHYMES GROUP"
"ABOUT NURSERY RHYMES"	
"SECRET OF RED DRAGONFLY"	
"INVITATION TO HOMETOWN SONGS"	
"ASSOCIATION OF NURSERY RHYMES OF TSUGARU"	
"GRANDFATHER'S CLOCK"	

FIG.17

DESCRIPTION OF SYMBOLS

1···CONTENT DISTRIBUTION SYSTEM 2A···CLIENT TERMINAL
4···PORTAL SERVER 10···CONTROLLER 12···HARD DISK DRIVE
15···DATA COMMUNICATION PROCESSING SECTION 30···CPU 44···
COMMUNICATION PROCESSING SECTION 45···NETWORK
INTERFACE